Louisiana Coastal Protection and Restoration
Engineering Technical Approaches and Innovations Workshop

Sponsored by USACE New Orleans District
Hosted by ERDC, Vicksburg, Mississippi
March 2 & 3, 2006

DAY ONE

Start Time	Duration (min)	Topic	Speaker
7:30	30	Sign In & Administration	Natalie Elwart
8:00	05	Welcome	Ed Russo
8:05	10	Introductions	ERDC
8:15	05	Day One Morning Objectives	Tim Ruppert
Overview of Coastal Louisiana			
8:20	25	Geology of Coastal LA	Del Britsch & Joe Dunbar
8:45	25	Geotechnical Design in Coastal LA	Pete Cali
9:10	25	Environment of Coastal LA	Bruce Baird
9:35	15	BREAK	
Hurricanes Protection			
9:50	25	Existing Protection System	Carl Anderson
10:15	25	Recent Storms: Betsy, Andrew, Ivan, Katrina, Rita	Nancy Powell
Design Storm			
10:40	25	Current Design Storm	Vann Stutts
11:05	25	Wave forces, Runup and Overtopping	Jeff Melby & Steve Hughes
11:30	25	Current Alternative Levee Alignments	Carl Anderson
11:55	65	LUNCH	
Innovative Methods			
13:00	25	Innovative Geotechnical Construction Methods	Pete Nicholson
13:25	40	Innovative Design of Barriers	George Filz
14:05	25	Innovative Structural Construction Methods	Robert Hall
14:30	15	BREAK	
14:45	10	Breakout Session Objectives	Tim Ruppert
Brainstorming Breakout Sessions			

14:55	50	Construction of Levees	
15:45	50	Construction of Walls	
16:35	50	Developing a Plan	
17:25		ADJOURN	

DAY TWO

Start Time	Duration (min)	Topic	Speaker
8:00	15	Day Two Objectives	Tim Ruppert
Presentation of Alternatives			
8:15	15	Group 1	
8:30	15	Group 2	
8:45	15	Group 3	
9:00	15	Group 4	
9:15	15	Group 5	
9:30	15	Group 6	
9:45	15	Group 7	
10:00	15	Group 8	
10:15	15	BREAK	
10:30	45	Review of Alternatives	MVN
11:15	15	Closing Comments	ERDC
11:30		ADJOURN	

Questions for discussion groups:

Construction of Levees

Conventional Construction

- What are the traditional ways to construct barriers?
- How do local conditions challenge traditional methods?
- What features or methods are used for monitoring and inspection?
- What are the appropriate Factors of Safety for hurricane protection?
- What is the appropriate percentage of organic content in borrow material?
- How can geosynthetics be used?
- Will we need breakwater barriers?
- What is the appropriate level of compaction?
- Can we use sand core levees?
- Where will access roads be located?

Innovative Construction

- What are some innovative ways to construct barriers?
- How can these methods overcome the challenging conditions?
- What early warning systems might be employed to alert of imminent failure?
- What features can be used to allow or protect stability in an overtopping event?
- What methods and materials will help reduce life cycle costs?
- Can we improve in situ soft soils?
- Are there building materials other than soil?
- What coastal protection or restoration features will enhance protection?
- What are the appropriate Factors of Safety for hurricane protection?
- What can be done to decrease settlement and spread of underlying soils?
- What technology can be deployed to monitor for quality assurance?
- Is soil-cement technology feasible for this work?
- Can lesser fills for zones of embankments (to encapsulate the sand core) be used if pvc sheetpile is used for seepage control?
- Should we use the latest USDOT methods for embankment design and construction?

Construction of Walls

- What are the traditional ways to construct barriers?
- How do local conditions challenge traditional methods?
- When is it appropriate and advantageous to construct combined levees and walls?
- What are the appropriate Factors of Safety for hurricane protection?
- What innovative construction methods can be used?
- What other types of structures can be used in this situation?
- Where will access roads be located?